

Applicant: Stoneback et al.
Application No.: 10/017,062

REMARKS

Claims 1-32 are currently pending in this application, as amended. By the foregoing amendment, Applicants have amended claims 1-3, 5, 7, 12, 15, 17, 18, 20, 23, and 27. No new matter has been introduced into the application by these amendments.

In the Action, claims 1-21, 23-24, 26-30 and 32 were rejected under 35 U.S.C. §102(b) as being anticipated by Williams (U.S. Patent No. 5,745,836). Applicants respectfully traverse this rejection.

Independent claims 1 and 12 are directed to a system for monitoring ingress noise in an HFC network; independent claims 5, 15, and 18 are directed to an HFC network which monitors ingress noise. Each of the claims 1, 5, 12, 15 and 18 recites a modem and an ingress noise monitoring and isolating interface to detect, isolate, and report ingress noise. Claims 1 and 5 recite a modem in communication with a domain manager to transmit and report detected ingress noise information. Claims 12, 15, and 18 recite a modem for noise reporting connected to an upstream-facing directional coupler.

In response to arguments presented in Applicants' November 3, 2003 Reply, the Examiner alleges that no limitation regarding receiving signals traveling upstream from remote points is presented in any of the pending claims. On the contrary, independent claims 1, 5, and 12 recite an ingress noise monitoring and

isolating interface to detect and isolate ingress noise. Further, independent claims 15 and 18 recite an ingress noise monitoring and isolating interface to monitor and isolate ingress noise. By definition, an ingress noise monitoring and isolating interface must receive signals (or noise) traveling upstream in order to monitor, detect, or isolate *ingress* noise. However, to further provide further illustration, the language of claims 1, 5, 12, 15, and 18 has been amended to recite “ingress noise *traveling upstream*”. The data receiver 220 disclosed by Williams fails to receive upstream traveling signals and therefore cannot monitor, detect or isolate ingress noise.

Applicants note a typographical error in the first sentence of the third paragraph of page 2 of the Action. Applicants respectfully assert that *neither* the microprocessor (240) nor the data receiver (220) disclosed by Williams monitors ingress noise. In response to Applicants’ assertion, the Examiner notes in the pending Action that the microprocessor (240) tests power levels and isolation capability and that the data receiver (220) performs status monitoring. The Examiner asserts that these features “as a whole provide a system, which ‘prevents and/or suppresses undesirable energy’”. However, regardless of whether or not the Williams device prevents or suppresses undesirable energy, Williams fails to suggest or disclose a BTP including an ingress noise monitoring and isolating interface to detect and isolate ingress noise as recited in claims 1 and 5. Also,

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Williams fails to suggest or disclose a BTP including an ingress noise monitoring and isolating interface to monitor and isolate ingress noise, as recited in claims 12, 15, and 18. Moreover, Williams fails to suggest or disclose a BTP including a modem to *report* noise as recited in claims 1, 5, 12, 15 and 18.

The Examiner asserts that in order to suppress ingress noise, the Williams system "must monitor it to see if there is any ingress noise to suppress", citing column 16, lines 61-67 of Williams. However, there is no disclosure in Williams to suggest that this is the case. The description of column 16, lines 61-67 cited by the Examiner concerns a *headend* 102 which includes a headend controller 710 which provides network monitoring. See column 16, lines 45-46. No disclosure is provided concerning a BTP as claimed and discussed above.

The Examiner further asserts that the element 250 transmits information to the headend 102 "which includes information regarding ingress noise". Applicants respectfully disagree with the Examiner's conclusion. Nowhere in the Williams reference is this stated nor can it be inferred. It is only mentioned that the "[r]eturn transmitter 250 is used to prepare and transmit diagnostic signals and/or administrative messages to the headend 102" and "for return gate isolation testing" (column 11, lines 8-14).

As stated in Applicants' previous Reply, Williams discloses an active system which requires transmission of a signal from a remote point (104, 290-292) or from

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the headend (102) to close a return gate (225). This configuration may incidentally suppress ingress noise, but Williams fails to disclose a BTP including an ingress noise monitoring interface, as claimed by Applicants in claims 1, 5, 12, 15, and 18. Furthermore, Williams fails to disclose a modem to transmit and report ingress noise information, as recited in claims 1 and 5. Without reporting of ingress noise, the Williams device relies on the prybar signal or headend control of the return gate (225) to cut off ingress. By contrast, the Applicants' claimed invention provides ingress noise monitoring in a BTP along with noise location reporting to allow noise ingress to be easily identified by location and remedied.

Accordingly, Applicants respectfully submit that independent claims 1, 5, 12, 15, and 18 are patentable over Williams. The remaining pending claims depend from one of claims 1, 5, 12, 15, and 18, and are therefore also patentable over the cited reference.

Claims 22 and 25 were rejected under 35 U.S.C. §103(a) as being unpatentable over Williams in view of U.S. Patent No. 5,847,190 (Bushue et al.). Applicants respectfully traverse this rejection.

Claim 31 was rejected under 35 U.S.C. §103(a) as being unpatentable over Williams in view of U.S. Patent No. 4,812,779 (Wagner). Applicants respectfully traverse this rejection.

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Both Bushue et al. and Wagner fail to remedy the deficiencies in Williams, as discussed above. Namely, Bushue et al. and Wagner fail to suggest or disclose a BTP including an ingress noise monitoring and isolating interface or a modem to report noise. Accordingly, withdrawal of the Section 103 rejections of claims 22, 25 and 31 is respectfully requested.

In view of the foregoing, Applicants respectfully assert that each of the pending claims 1-32 are patentable over the cited references. Reconsideration and allowance of the claims is respectfully requested.

If for any reason the Examiner believes that an interview, either telephonically or in person, would advance prosecution of the application, the Examiner is respectfully requested to contact the undersigned to arrange an interview.

Respectfully submitted,

Stoneback et al.
By 
Randolph J. Huis
Registration No. 34,626
(215) 568-6400

Volpe and Koenig, P.C.
United Plaza, Suite 1600
30 South 17th Street
Philadelphia, PA 19103

RJH/DPD